

Bidang Ilmu: Mikrobiologi Farmasi

**LAPORAN  
HIBAH PENELITIAN STRATEGIS NASIONAL  
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**PRODUKSI ANTIBIOTIKA BARU DARI  
*LECYTHOPHORA SP.*, JAMUR ENDOFIT  
TANAMAN *ALYXIA REINWARDTII* BL**

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**ABSTRACT**

Two endophytic fungal strains (specimen codes 30.1 and 30.5) which were isolated from the stem of *A. reinwardtii*, identified as *Lecythophora* sp.

The highest level of kojic acid ( $2238 \pm 62$ )  $\mu\text{g/ml}$  was obtained by *Lecythophora* sp. strain 30.5 using fermentation medium 2 with initial pH 5,6 and incubated at room temperature for 8 days under rotary shaking culture (100 rpm). On the contrary, the level of kojic acid production through static culture showing lower level compared to rotary shaking culture. The highest level is at ( $920 \pm 46$ )  $\mu\text{g/ml}$  or 0,09 g/L after 14 days of observation.

**ABSTRAK**

Telah berhasil diisolasi dan diidentifikasi berbagai jamur endofit dari *Alyxia reinwardtii* diantaranya jamur baru *Lecythophora* sp. Produksi tertinggi asam kojat *Lecythophora* sp. strain 30.5 mencapai ( $2238 \pm 62$ )  $\mu\text{g/ml}$  dalam media glukosa 50 g/L, yeast extract 5 g/L,  $\text{KH}_2\text{PO}_4$  1g/L,  $\text{MgSO}_4 \cdot 7\text{H}_2\text{O}$  0,5 g/L pH 5,6 pada suhu kamar dengan pengocokan 100 rpm selama delapan hari.

**Keywords:** *Lecythophora* sp, *Alyxia reinwardtii*, jamur endofit, asam kojat